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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/701,430	11/29/2000	Toshio Yamada	WATK:204	9774

7590 05/04/2004

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EXAMINER	
TRAN, HIEN THI	

ART UNIT	PAPER NUMBER
1764	

DATE MAILED: 05/04/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/701,430	YAMADA ET AL.	
	Examiner	Art Unit	
	Hien Tran	1764	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☐ Responsive to communication(s) filed on _____.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) 1-7 is/are pending in the application.

4a) Of the above claim(s) 7 is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) 1-6 is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☒ Claim(s) 1-7 are subject to restriction and/or election requirement.

Application Papers

9)☒ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on 29 November 2000 is/are: a)☐ accepted or b)☒ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date 12/02/03,10/21/02.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Election/Restrictions

1. Restriction to one of the following inventions is required under 35 U.S.C. 121:

I. Claims 1-6 drawn to a canning structure, classified in class 422, subclass 180.

II. Claim 7, drawn to a method for producing a ceramic catalytic converter, classified in class 29, subclass 890.

The inventions are distinct, each from the other because of the following reasons:

2. Inventions I and II are related as process of making and product made. The inventions are distinct if either or both of the following can be shown: (1) that the process as claimed can be used to make other and materially different product or (2) that the product as claimed can be made by another and materially different process (MPEP § 806.05(f)). In the instant case, that the product as claimed can be made by another and materially different process, such as the one not required the catalyst, flange and cone portion.

3. Because these inventions are distinct for the reasons given above and have acquired a separate status in the art as shown by their different classification, recognized divergent subject matter and the search required for Group I is not required for Group II, restriction for examination purposes as indicated is proper.

4. During a telephone conversation with Mr. Charles A. Wendel on 04/23/03 a provisional election was made with traverse to prosecute the invention of Group I, claims 1-6. Affirmation of this election must be made by applicant in replying to this Office action. Claim 7 is withdrawn from further consideration by the examiner, 37 CFR 1.142(b), as being drawn to a non-elected invention.

5. Applicant is reminded that upon the cancellation of claims to a non-elected invention, the inventorship must be amended in compliance with 37 CFR 1.48(b) if one or more of the currently named inventors is no longer an inventor of at least one claim remaining in the application. Any amendment of inventorship must be accompanied by a petition under 37 CFR 1.48(b) and by the fee required under 37 CFR 1.17(i).

Priority

6. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

Drawings

7. Figures 4, 5 should be designated by a legend such as --Prior Art-- because only that which is old is illustrated. See MPEP § 608.02(g). A proposed drawing correction or corrected drawings are required in reply to the Office action to avoid abandonment of the application. The objection to the drawings will not be held in abeyance.

8. The drawings have not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is requested in correcting any errors of which applicant may become aware in the drawings to comply with CFR 1.84(p)(5), e.g. they should include the reference sign(s) mentioned in the specification and vice versa.

Specification

9. The disclosure is objected to because of the following informalities:

On page 3, line 20 it is unclear as to what is intended by "20-odd %".

On page 5, lines 11, 13 reference to claim 1 is improper and should be deleted.

Appropriate correction is required.

10. The specification has not been checked to the extent necessary to determine the presence of all possible minor errors. Applicant's cooperation is requested in correcting any errors of which applicant may become aware in the specification.

Claim Rejections - 35 USC § 102

11. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

12. Claims 1, 4 are rejected under 35 U.S.C. 102(b) as being anticipated by Close et al (3,959,865).

Close et al discloses an apparatus comprising: a ceramic honeycomb structure 20 before carrying a catalyst; a metal case 10 and a holding material 30, 22, located between the honeycomb structure 20 and the metal case 10 (col. 2, lines 18-31; col. 3, lines 16-17, 47-60; col. 5, lines 36-46; col. 6, lines 12-14, Fig. 1).

Instant claims 1, 4 structurally read on the apparatus of Close et al.

13. Claims 1, 6 are rejected under 35 U.S.C. 102(b) as being anticipated by Merry (5,028,397).

Merry discloses an apparatus comprising: a ceramic honeycomb structure 20; a metal case 11 and a holding material 31 located between the honeycomb structure 20 and the metal case 11, wherein the holding material 31 including ceramic fibers, such as alumina-silica fibers, etc. (col. 2, lines 47-69; col. 6, lines 42-45; Figs. 1-2).

Instant claims 1, 6 structurally read on the apparatus of Merry.

14. Claims 1-3, 6 are rejected under 35 U.S.C. 102(b) as being anticipated by Langer et al (WO 98/35144).

Langer et al discloses an apparatus comprising: a ceramic honeycomb structure 20, 42 before carrying a catalyst; a metal case 11, 44 and a holding material 30, 50, located between the honeycomb structure and the metal case; the holding material comprising non-intumescent ceramic fibers; the thickness of the cell wall being 0.1 mm or less (pages 20-23).

Instant claims 1-3, 6 structurally read on the apparatus of Langer et al.

15. Claims 1-4, 6 are rejected under 35 U.S.C. 102(e) as being anticipated by copending Application No. 09/604,660.

The applied reference has a common inventor with the instant application. Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 102(e) might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the reference was derived from the inventor of this application and is thus not the invention "by another," or by an appropriate showing under 37 CFR 1.131.

The copending Application No. 09/604,660 discloses an apparatus comprising: a ceramic honeycomb structure 10 before carrying a catalyst; a metal case 11 and a holding material 13, located between the honeycomb structure and the metal case; the holding material comprising non-intumescent ceramic fibers; the thickness of the cell wall being 0.1 mm or less (page 11).

Claim Rejections - 35 USC § 103

16. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

17. The factual inquiries set forth in *Graham* **v.** *John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

18. The art area applicable to the instant invention is that of catalytic converter.

One of ordinary skill in this art is considered to have at least a B.S. degree, with additional education in the field and at least 5 years practical experience working in the art; is aware of the state of the art as shown by the references of record, to include those cited by applicants and the examiner (*ESSO Research & Engineering V Kahn & Co*, 183 USPQ 582 1974) and who is presumed to know something about the art apart from what references alone teach (*In re Bode*, 193 USPQ 12, (16) CCPA 1977); and who is motivated by economics to depart from the prior art to reduce costs consistent with the desired product characteristics. *In re Clinton* 188 USPQ 365, 367 (CCPA 1976) and *In re Thompson* 192 USPQ 275, 277 (CCPA 1976).

19. Claims 2-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over either Close et al (3,959,865) or Merry (5,028,397) in view of Machida et al (5,866,079).

The apparatus of Close et al or Merry is substantially the same as that of the instant claim, but fails to disclose the specific type of the case, the holding material and the thickness of the cell walls as claimed.

However, Machida et al discloses the conventionality of providing a holding material made of non-intumescent ceramic fiber mat, the metal case has either stuffing structure or tourniquet structure and the thickness of the cell walls is from 0.05 to 0.15 mm which encompasses the instant range.

It would have been obvious to one having ordinary skill in the art to alternately select the non-expanding ceramic fiber mat of Machida et al as the holding material in the apparatus of Close et al or Merry, if not inherent therein, to as to effectively protect the honeycomb structure from damage in a practical use condition.

It would have been obvious to one having ordinary skill in the art to alternate select an appropriate case structure as taught by Machida et al in the apparatus of Close et al or Merry, on the basis of its suitability for the intended use as a matter of obvious design choice, and since either structure is conventional in the art and no cause for patentability in apparatus claims.

It would have been obvious to one having ordinary skill in the art to substitute the honeycomb structure of Machida et al for the honeycomb structure of Close et al or Merry since the thin wall honeycomb structure would increase the open frontal area and decrease pressure loss as taught by Machida et al.

20. Claims 4-5 are rejected under 35 U.S.C. 103(a) as being unpatentable by Langer et al (WO 98/35144) in view of Machida et al (5,866,079).

The same comments with respect to Machida et al regarding the structure of the case apply.

21. Claims 4-5 are provisionally rejected under 35 U.S.C. 103(a) as being obvious over copending Application No. 09/604,660 in view of Machida et al (5,866,079).

The copending Application No. 09/604,660 has a common inventor with the instant application. Based upon the earlier effective U.S. filing date of the copending application, it would constitute prior art under 35 U.S.C. 102(e) if published or patented. This provisional rejection under 35 U.S.C. 103(a) is based upon a presumption of future publication or patenting of the conflicting application.

This provisional rejection might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the copending application was derived from the inventor of this application and is thus not the invention "by another," or by a showing of a date of invention for the instant application prior to the effective U.S. filing date of the copending application under 37 CFR 1.131. For applications filed on or after November 29, 1999, this rejection might also be overcome by showing that the subject matter of the reference and the claimed invention were, at the time the invention was made, owned by the same person or subject to an obligation of assignment to the same person. See MPEP § 706.02(l)(1) and § 706.02(l)(2) .re rejected under 35 U.S.C. 103(a) as being unpatentable by copending Application No. 09/604,660.

The same comments with respect to Machida et al regarding the structure of the case apply.

Double Patenting

22. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and, *In re Thorington,* 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

23. Claims 1, 6 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-9 of copending Application No. 09/604,660. Although the conflicting claims are not identical, they are not patentably distinct from each other because they are directed to the same conceptual invention.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

24. Claims 2-5 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-9 of copending Application No. 09/604,660 in view of Machida et al (5,866,079).

The same comments with respect to Machida et al apply.

This is a provisional obviousness-type double patenting rejection.

Conclusion

25. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hien Tran whose telephone number is (571) 272-1454. The examiner can normally be reached on Tuesday-Friday from 7:30AM-6:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Glenn Caldarola can be reached on (571) 272-1444. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Hien Tran

Hien Tran
Primary Examiner
Art Unit 1764

HT
April 27, 2004